UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/562,108	12/22/2005	Klaus Bloch	MMG-134	6270
42419 PAULEY PETI	7590 02/21/2007 ERSEN & ERICKSON		EXAMINER	
2800 WEST HIGGINS ROAD SUITE 365 HOFFMAN ESTATES, IL 60195			HURLEY, SHAUN R	
			ART UNIT	PAPER NUMBER
	,		3765	-
,				
SHORTENED STATUTORY PERIOD OF RESPONSE		MAIL DATE	DELIVERY MODE	
3 MONTHS		02/21/2007	PAPER	

Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

Office Action Summary		Application No.	Applicant(s)			
		10/562,108	BLOCH, KLAUS			
		Examiner	Art Unit			
		Shaun R. Hurley	3765			
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply						
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).						
Status						
2a) <u></u>	<ol> <li>Responsive to communication(s) filed on <u>22 December 2005</u>.</li> <li>This action is FINAL. 2b) This action is non-final.</li> <li>Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i>, 1935 C.D. 11, 453 O.G. 213.</li> </ol>					
Dispositi	ion of Claims					
5) □ 6) ☑ 7) □ 8) □ <b>Applicati</b> 9) ☑ 10) □	Claim(s) 1-38 is/are pending in the application.  4a) Of the above claim(s) is/are withdraw Claim(s) is/are allowed.  Claim(s) 1-38 is/are rejected.  Claim(s) is/are objected to.  Claim(s) are subject to restriction and/or is/are specification is objected to by the Examiner The drawing(s) filed on is/are: a) access Applicant may not request that any objection to the or Replacement drawing sheet(s) including the correction The oath or declaration is objected to by the Examiner Replacement drawing sheet(s) including the correction of the oath or declaration is objected to by the Examiner Replacement drawing sheet(s) including the correction of the oath or declaration is objected to by the Examiner Replacement drawing sheet(s) including the correction of the oath or declaration is objected to by the Examiner Replacement drawing sheet(s) including the correction of the oath or declaration is objected to by the Examiner Replacement drawing sheet(s) including the correction of the oath or declaration is objected to by the Examiner Replacement drawing sheet(s) including the correction of the oath or declaration is objected to by the Examiner Replacement drawing sheet(s) including the correction of the oath or declaration is objected to by the Examiner Replacement drawing sheet(s) including the correction of the oath or declaration is objected to by the Examiner Replacement drawing sheet(s) including the correction of the oath or declaration is objected to by the Examiner Replacement drawing sheet(s) including the correction of the oath or declaration is objected to by the Examiner Replacement drawing sheet(s) including the correction of the oath or declaration is objected to by the Examiner Replacement drawing sheet(s) including the correction of the oath or declaration is objected to by the Examiner Replacement drawing sheet(s) including the correction of the oath of the oath or declaration is objected to by the Examiner Replacement drawing sheet(s) including the oath of the oath of	wn from consideration.  r election requirement.  r.  epted or b)  objected to by the Edrawing(s) be held in abeyance. See ion is required if the drawing(s) is objected to by the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required if the drawing(s) is objected to by the legan is required in the legan is required to be a legan in the legan in th	ected to. See 37 CFR 1.121(d).			
Priority u	ınder 35 U.S.C. § 119					
12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  a) All b) Some * c) None of:  1. Certified copies of the priority documents have been received.  2. Certified copies of the priority documents have been received in Application No  3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  * See the attached detailed Office action for a list of the certified copies not received.						
2) 🔲 Notice 3) 🔲 Inform	e of References Cited (PTO-892) e of Draftsperson's Patent Drawing Review (PTO-948) nation Disclosure Statement(s) (PTO/SB/08) r No(s)/Mail Date	4) Interview Summary ( Paper No(s)/Mail Dat 5) Notice of Informal Pa 6) Other:	te			

Application/Control Number: 10/562,108

Art Unit: 3765

#### DETAILED ACTION

Page 2

### Drawings

1. Applicant is advised that while his specification describes Figures, no figures are present in the present application. As such, Applicant should file drawings with his response to this Office Action. Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

#### Specification

2. Applicant is reminded of the proper language and format for an abstract of the disclosure.

The abstract should be in narrative form and generally limited to a single paragraph on a separate sheet within the range of 50 to 150 words. It is important that the abstract not exceed 150 words in length since the space provided for the abstract on the computer tape used by the printer is limited. The form and legal phraseology often used in patent claims, such as "means" and "said," should be avoided. The abstract should describe the disclosure sufficiently to assist readers in deciding whether there is a need for consulting the full patent text for details.

Application/Control Number: 10/562,108

Art Unit: 3765

Page 3

The language should be clear and concise and should not repeat information given in the title. It should avoid using phrases which can be implied, such as, "The disclosure concerns," "The disclosure defined by this invention," "The disclosure describes," etc.

# Claim Rejections - 35 USC § 112

- 3. The following is a quotation of the second paragraph of 35 U.S.C. 112:
  - The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.
- 4. Claims 13 and 16are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.
- 5. Regarding claim 13, the phrase "particularly" renders the claim indefinite because it is unclear whether the limitation(s) following the phrase are part of the claimed invention. See MPEP § 2173.05(d).
- 6. Regarding claim 16, what is meant by "one of carbon"? Examiner fails to see multiple options. Further, what does "conductive filament/filament" mean? Should this be "conductive filament/filament yarn"?

# Claim Rejections - 35 USC § 103

- 7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 8. Claims 1-10, 12-18, 20-28, 31-36, and 38 are rejected under 35 U.S.C. 103(a) as being unpatentable over Adorno (5802828).

Art Unit: 3765

Adorno teaches a textile yarn having a core and a sheath surrounding the core (Abstract; Figures 2, 3), wherein the sheath is formed from a plurality of slit film tapes made of polytetrafluoroethylene having a dtex of 330-450 (Column 3, lines 43-52) and wound about a core of high tenacity synthetic organic continuous filaments having a dtex of 110-1760, a fine tensile strength of at least 20 cN/dtex and an elongation at tear of at least 8% (Abstract) capable of use as a fishing line. While Adorno essentially teaches the invention as discussed, he fails to specifically teach alternating S/Z wraps. It would have been obvious to one of ordinary skill in the art, at the time the invention was made, to have utilized such directions, so as to ensure complete coverage of the core. Alternating wraps with multiple tapes is well known in the art, and the ordinarily skilled artisan would have known to do such, thus ensuring protection of the core against abrasion, snagging, and other destructive elements. Likewise, the use of 2 mm tapes would ensure snagging was reduced, due to less surface to catch upon.

In regards to slightly twisting the core filaments, such a negligible twist is well known in the art, so as to allow for further processing. It is impossible to transfer, transport, even wind completely untwisted multifilament yarn. In practice, all multifilament yarns are given a negligible amount of twist so as to keep the filaments in contact with one another, avoid splay and spreading of the filaments.

In regards to the core being PTFE, Adorno teaches aramid which is comparable to PTFE in strength properties, but used for different applications when environmental factors should be considered. It would have been obvious, however, to one of ordinary skill in the art, at the time the invention was made, to have utilized such a material, so as to reduce production costs by utilizing the same material for the core and sheath, allowing for a reduction in waste. Likewise,

Adorno teaches the PTFE used can be mixed with carbon, producing an electrically conductive yarn of 10<sup>1</sup> - 10<sup>1</sup> ohms/cm.

## **Double Patenting**

9. The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. A nonstatutory obviousness-type double patenting rejection is appropriate where the conflicting claims are not identical, but at least one examined application claim is not patentably distinct from the reference claim(s) because the examined application claim is either anticipated by, or would have been obvious over, the reference claim(s). See, e.g., *In re Berg*, 140 F.3d 1428, 46 USPQ2d 1226 (Fed. Cir. 1998); *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970); and *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) or 1.321(d) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent either is shown to be commonly owned with this application, or claims an invention made as a result of activities undertaken within the scope of a joint research agreement.

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

10. Claims 1-38 provisionally rejected on the ground of nonstatutory obviousness-type double patenting as being unpatentable over claims 1-11, 13, 32-37, 39, and 50 of copending Application No. 10/918334. Although the conflicting claims are not identical, they are not patentably distinct from each other because each teaches a core wrapped structure capable of use as a fishing line.

This is a <u>provisional</u> obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

Application/Control Number: 10/562,108 Page 6

Art Unit: 3765

Conclusion

11. The prior art made of record and not relied upon is considered pertinent to applicant's

disclosure. Patel et al (20060162312), Hollenbaugh et al (5288552), Hollenbaugh et al

(5364699), Mori et al (6335093), Fidan et al (6855423), Hornez et al (20050144927), and

Hornez et al (6905764) all teach what is well known in the art.

12. Any inquiry concerning this communication or earlier communications from the

examiner should be directed to Shaun R. Hurley whose telephone number is (571) 272-4986.

The examiner can normally be reached on Mon - Fri, 6:30 am - 3:00 pm, off second Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, Gary Welch can be reached on (571) 272-4996. The fax phone number for the

organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent

Application Information Retrieval (PAIR) system. Status information for published applications

may be obtained from either Private PAIR or Public PAIR. Status information for unpublished

applications is available through Private PAIR only. For more information about the PAIR

system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR

system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would

like assistance from a USPTO Customer Service Representative or access to the automated

information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Shaun R Hurley

Examiner

Art Unit 3765

SRH

01 February 2007